

This Page Is Inserted by IFW Operations
and is not a part of the Official Record

BEST AVAILABLE IMAGES

Defective images within this document are accurate representations of the original documents submitted by the applicant.

Defects in the images may include (but are not limited to):

- BLACK BORDERS
- TEXT CUT OFF AT TOP, BOTTOM OR SIDES
- FADED TEXT
- ILLEGIBLE TEXT
- SKEWED/SLANTED IMAGES
- COLORED PHOTOS
- BLACK OR VERY BLACK AND WHITE DARK PHOTOS
- GRAY SCALE DOCUMENTS

IMAGES ARE BEST AVAILABLE COPY.

**As rescanning documents *will not* correct images,
please do not report the images to the
Image Problem Mailbox.**

Title: Novel CARD Proteins Involved In Cell Death Regulation

Inventors: John C. Reed

Filing Date: April 20, 2004

Attorney Client-Matter No.: 66821-281

USPTO Customer No. 41552 (858-535-9001)

1/9



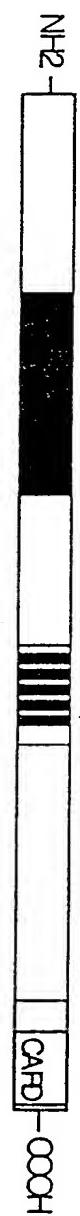
NAC α

NB-ARC LRR



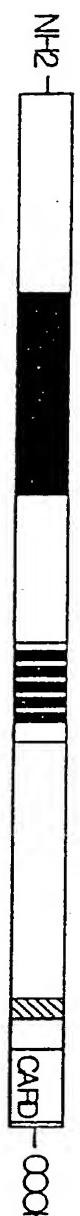
NAC β

NB-ARC LRR



NAC γ

NB-ARC LRR



NAC δ

NB-ARC LRR

Title: Novel Card Proteins Involved In Cell Death Regulation

Inventors: John C. Reed

Filing Date: April 20, 2004

Attorney Client-Matter No.: 66821-281

USPTO Customer No. 41552 (858-535-9001)

2/9

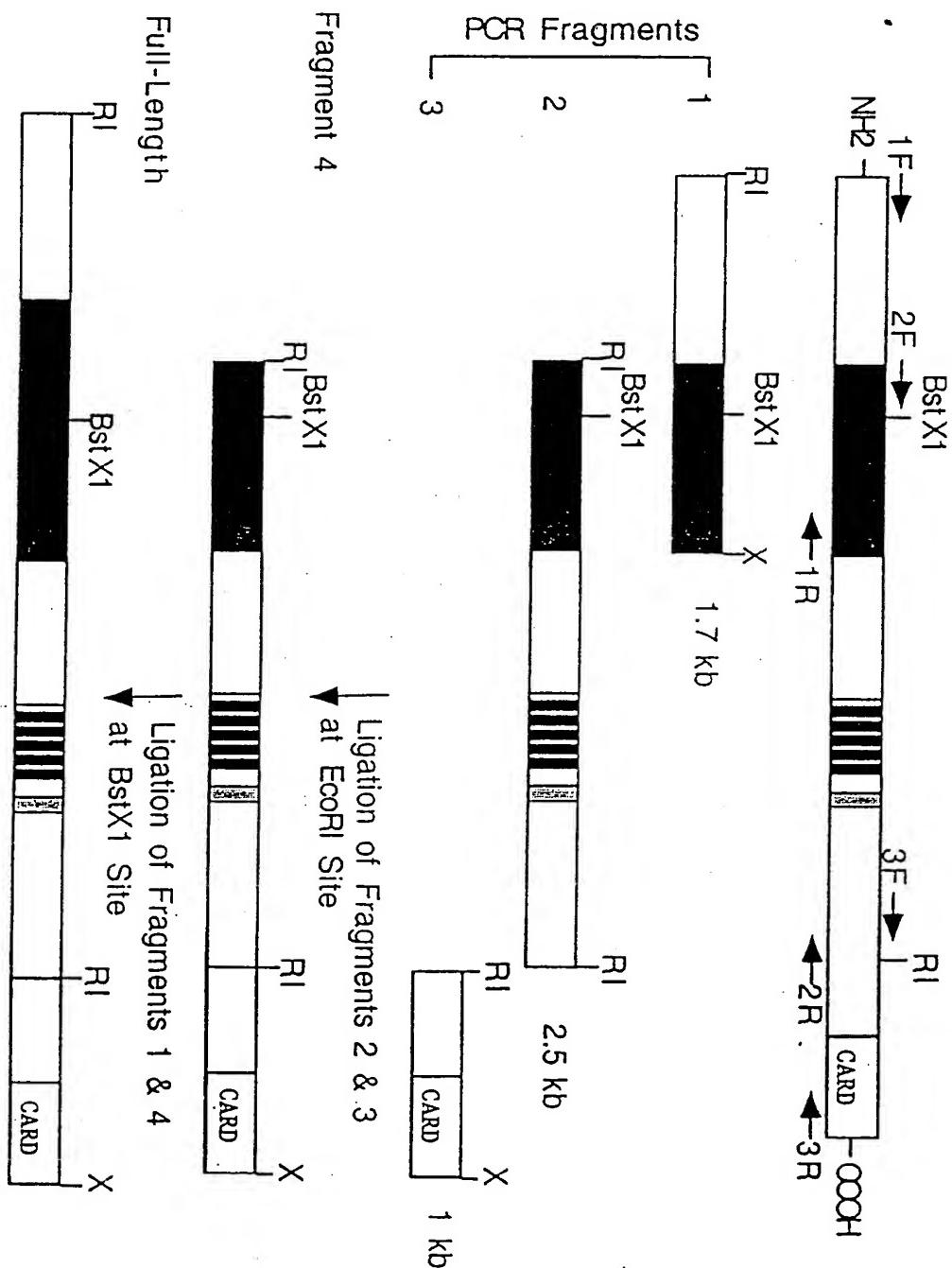


FIGURE 1D

NAC	(329-547)
CARD4	(197-408)
ApaF-1	(138-352)
CD4	(154-374)

P-loop (Walker A)
 I-VLPGCAAGCKSIIAROMKEANGRQI-YDRSHQHVEYES-
 TIPIDPQDCEVCKSMULORIQSTWATERDACKP-FHEER-
 WLDLGAGGCKSVIAE-SYRDHSLE-SCFPGGVHANVSKQDKSGLKLONCIRUDODESFSOR
 FGFLHGRAGSCKSVIASY-J-SIKSDQI-L-SINVDSTVNLKQSGTAPKSTFDLJIDILMUKSEDDY-LN

Walker B

--GTTATPAPIROT---SR-PERLINDEN-DE--PGMVIOEPSSSELCHWSQEPADATTSSTICK
 YCVYPERDPEEVEAFU---LREFHVAGTEBED-DEHLSDLDSRVPSDSJ-PWEPAHPI-VLAMNUSC
 LELNIEEEAKDRRUTM---URKHPSMLLTDWDNS---NUKWDSDQ-QQILWPKSVIDSMSCPY
 FESVBHVTSTVVKRMQCNALIDRNTLEFDDVQETIRAL-ZELRLR-3-IVWDRVEISNQSQC
 TIDEPEASFLIPAR-----VIAQLNLTPLSQARWVEMLGESESSESPREKEFYKRY-TIDE
 KLUKGASKULLVAR-----IGIE---WPERQFLRKVTLRCESPSHJRAVARIM-EPER
 YVJPESSLSKEKGLETLSLF-VNKKKADLPEAQ-HSIKECKBSP-TWSLIGLJRDPEPNWETLK
 EFPYL-TSLEIDEPYDFUEAYGMPMPVGKEEDWLNKTIELSSNPATLUNYMEKSCPTVIERAQLN-N

NAC	(329-547)
CARD4	(197-408)
ApaF-1	(138-352)
CD4	(154-374)

RQIN-FAFLRVKSNKEIWAQCLVENSMLACTJMQQMKRK
 ALDDWLSQLEANNPNCISLOSVELFCMILERCFQHRAAF
 QUNQKOFKRIRKSSY-----D-VENDEA
 KJESFGJBGBECCITPY-----SYKSI

FIGURE 1E

H1 H2 H3 H4 H5 H6

DDAPDQHIFVDOYRBDTIVRIVSIVWVNUKU-HGOVIVSQDPOYRERV--LAENTRPSOMKIFSTJSOSWDRKCGG-Ty-YALKETILIMELWEGSK
 VDAAKRS-NCLULOHRRBAEKOKITS-YIMPHNTSDFEFITLSEEKVNERP--RQCORUMAMIKMILKQNDSYVSTFNNTLHECY-KDIALMHDG
 ESHHII-OLESKNRELVYHTRNTOCLVNUJSDQYFSAEDABTV-CNCPYQDQKIKYQDIDVSKGEEVSFELKLUQDADYDPRW
 LCEFLCRALSTTHTR-LTIDFEPRD-AUVEECKNUFEDISPLTSKMS-KRERJANFRTI-RROASELGPLIDFFNNOSH-LADDEPXY
 VRODRER-SMERNIMMMESSLKVDEL-TEVTAQVNSDAGPMV-SGCVREXQEVKAVDGRDQYDADYDPRWRSIG-HEGLAEVSPJA
 VGRDUK-DVRSLSRLRLEJNEVVEGVWVOYKOEGTIVENHIIQEN-RTQIGDQYQMLDIDPFRGPKADJDLSIDEEFWREKUKKARBEAM
 VPHHQ-ETLKKKTRVVAKQHJISEL-LEMLKQHITPQHETLQI-CKVGSFSPNVELLEJZKRGDAFSPAHYRQK--QHSLBMDLWY
 VDPRD-RULRCKLRLEVLLQVPL-WWVLSREIFRPHMIEDIQRAGSSESPRQDRLMIDLWNGSDAPIPLFISCPDQ-GDMLASLPUQPR

FIGURE 2A

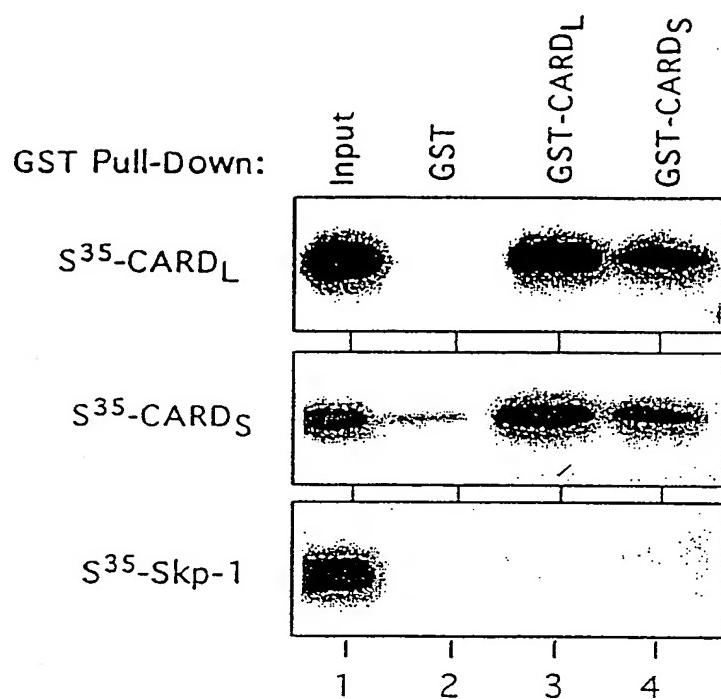
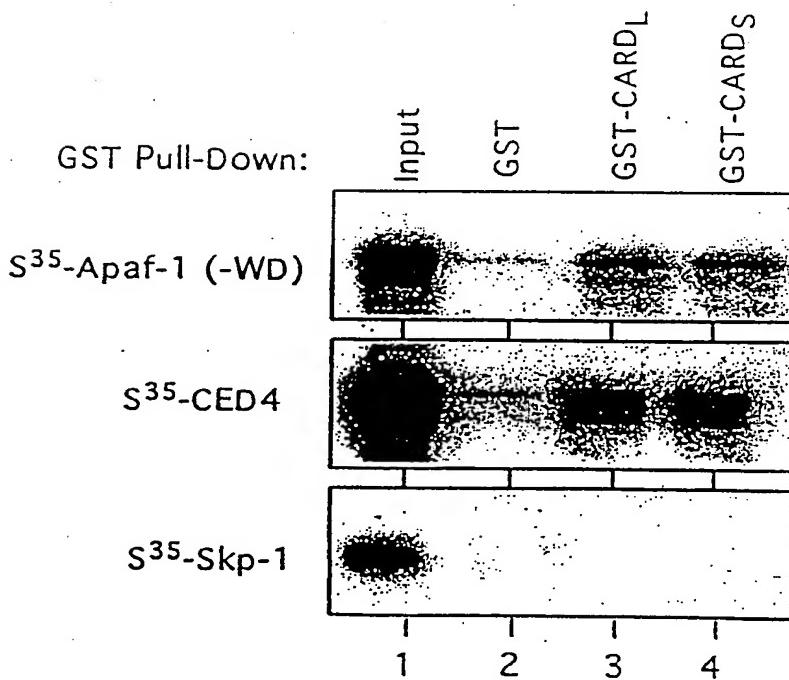


FIGURE 2B



Title: Novel Card Proteins Involved In Cell Death Regulation

Inventors: John C. Reed

Filing Date: April 20, 2004

Attorney Client-Matter No.: 66821-281

er No. 4

Title: Novel Card Proteins Involved In Cell Death Regulation

Inventors: John C. Reed

Filing Date: April 20, 2004

Attorney Client-Matter No.: 66821-281

USPTO Customer No. 41552 (858-535-9001)

7/9

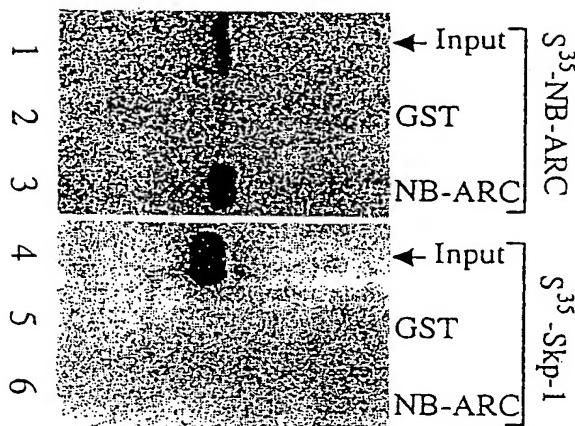


FIGURE 5A

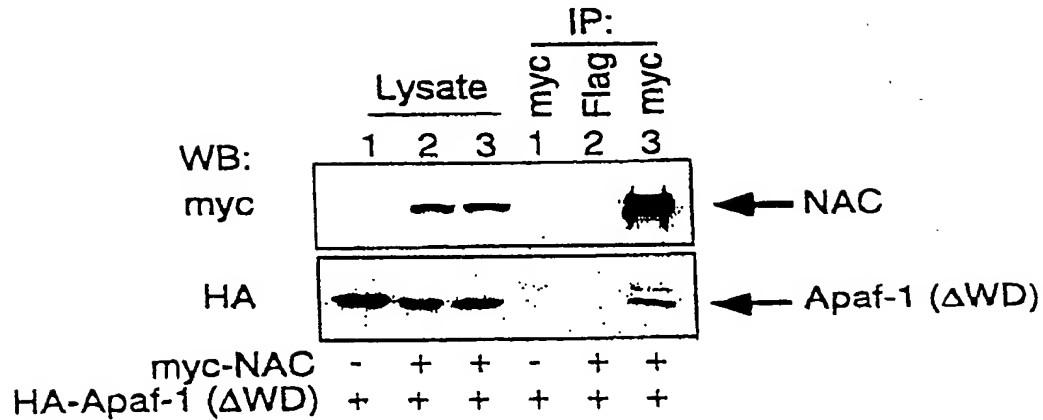


FIGURE 5B

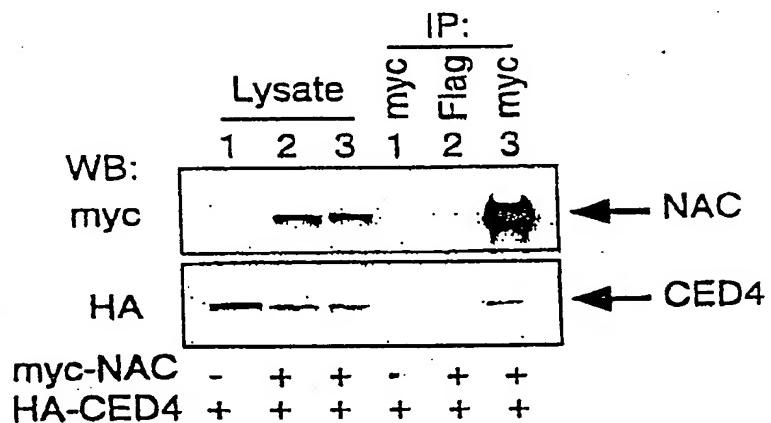


FIGURE 6A

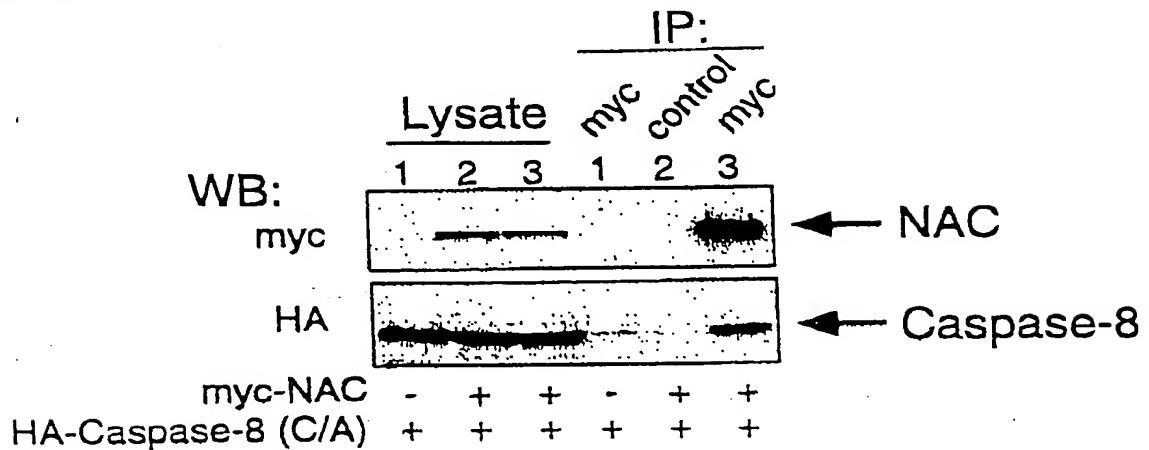


FIGURE 6B

